FEDERAL COMMUNICATIONS COMMISSION

**CLASS OF STATION** 

STH

The following application is submitted for action by the Chief, Broadcast Bureau.

FILE NUMBER

CALL

APPLICANT AND LOCATION

NATURE OF APPLICATION

**BPED** 

-900905ML NEW N/M 89.3MHZ BEACON BROADCASTING CORPORATION ALLENTOWN

CP FOR NEW FM EDUCATIONAL ON: FREQUENCY: 89.3 MHZ; ERP:0.150

KW H&V; HAAT: 244.8 METERS H&V40 33 54 75 26 26

Shin TIM

# **ORIGINAL**

### ~Southmayd Simpson & Miller

ORICHAL!

1233 Twentieth Street, N.W. Second Floor Washington, D.C. 20036 Telephone: (202) 331-4100 Telecopier: (202) 331-4123

Ser 6 3 05 PH 90

September 5, 1990

RECEIVED

'SEP - 5 1990

Federal Communications Commission Office of the Secretary

Ms. Donna R. Searcy Secretary Federal Communications Commission 1919 M Street, N.W. Washington, D.C. 20554

Dear Ms. Searcy;

Transmitted herewith, in triplicate, on behalf of Beacon Broadcasting Corporation is an FCC From 340 application seeking a construction permit for a noncommercial, educational FM station on Channel 207A at Allentown, Pennsylvania.

The applicant is a non-profit corporation with an educational objective and is applying for a noncommercial, educational broadcast facility. Accordingly, this is a fee-exempt application under the Commission's fee schedule and procedures. The application contains a copy of Beacon's articles of incorporation in support of the fee exemption.

Please contact the undersigned should you have any questions on this matter.

Very truly yours,

Beacon Broadcasting Corporation

SEP O 6 1990

(1)

Its Attorne

89.3MHZ
BPED -900905ML NEW
ALENTOWN PA
BEACON BROADCASTING CORPORATION

Federal Communications Commission Washington, D. C. 20554

FCC 340

Call 30

Approved by OMB 3060-0034 Expires 4/30/92

Expires 4/30/92
See Page 23 for information regarding public burden estimate

# APPLICATION FOR CONSTRUCTION PERMIT FOR NONCOMMERCIAL EDUCATIONAL BROADCAST STATION

(Carefully read instructions before filing form)

Return only form to FCC

			For Commission Use O	••••	
Section   - GENERAL INFO	ORMAT I ON		File No. BPED 9	00905	mc
	PECEIVED				
1. Name of Applicant	•	5 1	ces and communications t	o the following	g person
Beacon Broadcasting Co	rnoristant 5 1990	Name	iress below:		
		Jeffre	/ D. Southmayd		
	Federal Communications Commit Office of the Secretary	Southm	ayd, Simpson & Mil	ler	
Street Address or P.O. Box			dress or P.O. Box	<del></del>	
401 North 17th Street.			Oth Street, N.W.,	Suite 205	
City Allentown	State ZIP Co PA 18104	de   City   Washing	aton	State DC	ZIP Co 20036
Telephone No. Include Area Code (215) 439-0044		Telephone	No. (Include Area Code)		
•			<b></b>	T.,	
2. This application is for:	L AM	FM	ا ــا	TV	
(a) Channel No. or Frequency			City	1	State
003	1 1	rincipal A			
207A 89.3		A A	llentown	1	PA
(c) Check one of the following	<b>:</b> .				
	:				
	: ·				
Acalientina for hiridicans					
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	Beacon Broadcasting Corporation	
	1. Applicant is: [Check one box below]	
	(a) governmental or public educational agency, board or institution	
	(b) private nonprofit educational institution	
	(c) Other Ispecify!	
	2. For applicants 1(c) only, describe in an Exhibit the nature and educational purposes of the applicant.	Exhibit No.
	3. For applicants 1(c) applying for a new noncommercial educational television station only, describe in an Exhibit how the applicant's officers, directors and members of its governing board are broadly representative of the educational, cultural and civic segments of the principal community to be served.	Exhibit No.
<u></u>	4. Describe in an Exhibit how the proposed station will be used, in accordance with 47 C.F.R. Section 73.503 or Section 73.621, for the advancement of an educational program.	Exhibit No.
	5. Is there any provision contained in any by-laws, articles of incorporation, partnership agreement, charter, statute or other document which would restrict the applicant in advancing an educational program or complying with any Commission rule, policy or provision of the Communications Act of 1934, as amended?	Yes
	If Yes, provide particulars in an Exhibit.	Exhibit No.
	CITIZENSHIP AND OTHER STATUTORY REQUIREMENTS	LN/A
	f (2) le the tentionet is violatine of the possicione of Section 210 of the Communications Act of 1034	☐ v <sub>v</sub> c
	•	
	, W.	
·		

#### PARTIES TO APPLICATION

8. Complete the following Table with respect to all parties to this application:

**(NOTE: If the applicant considers that to furnish complete information would pose an unreasonable burden, it may request that the Commission waive the strict terms of this requirement with appropriate justification.)** 

instructions: If applicant is a corporation or an unincorporated association with 50 or fewer stockholders, stock subscribers, holders of membership certificate or other ownership interest, fill out all columns, giving the information requested as to all officers, directors and members of governing board. In addition, give the information as to all persons or entities who are the beneficial or record owners of or have the right to vote capital stock, membership or ownership interests or are subscribers to such interests. If the applicant has more than 50 stockholders, stock subscribers or holders of membership certificates or other ownership interests, furnish the information as to officers, directors, members of governing board, and all persons or entities who are the beneficial or record owners of or have the right to vote 1% or more of the capital stock, membership or ownership interests. If applicant is a governmental or public educational agency, board or institution, fill out columns (a), (b), and (c) as to all members of the governing board and chief executive officers.

Name and Residence Address(es)	Office Held	Director or Member of Governing Board	% of: Ownership (O) or Voting Stock (VS) or Membership (M)
(a)	(b)	YES NO	(d)
John P. Hentosh, M.D. 401 North 17th Street Allentown, PA 18104	President	X	1 Vote
Nestor E. Barolin 460 Longacre Drive Cherryville, PA 18035	Secretary	x .	1 Vote
Brooke Hartman, Sr. 1168 Bellair Court Allentwon, PA 18103	Treasurer	X	1 Vote
George Becker 2452 South Lumber Street Allentwon, PA 18062		x	1 Vote
John Carpenter 107 South Walnut Street Macungie, PA 18062		x	1 Vote
Robert Walker 6610 Crown Lane Zionsville, PA 18092		X	1 Vote
,			

### Section II - LEGAL QUALIFICATIONS (Page 3)

9.	Does the applicant or any party to this application have, or have they had, any interest in:	
	(a) a broadcast station, or pending broadcast station application before the Commission?	Yes No
	(b) a broadcast application which has been dismissed with prejudice by the Commission?	Yes No
	(c) a broadcast application which has been denied by the Commission?	Yes No
	(d) a broadcast station, the license of which has been revoked?	Yes No
	(e) a broadcast application in any pending or concluded Commission proceeding which left unresolved character issues against the applicant?	Yes No
	If the answer to any of the questions in (a)-(e) above is Yes, state in an Exhibit the following information:	Exhibit No.

- (1) Name of party having interest;
- (2) Nature of interest or connection, giving dates;
- (3) Call letters of stations or file number of application or docket; and
- (4) Location.

### SECT.ION III - FINANCIAL QUALIFICATIONS

	Note: If this application is for a change in an operating facility, DO NOT fill out this Section.
	Is this application contingent upon receipt of a grant from the National Telecommunications and Yes       Information Administration?
	2. Is this application contingent upon receipt of a grant from a charitable organization, the approval of the budget of a school or university, or an appropriation from a state, county, municipality or other political subdivision?
	NOTE: If either Questions 1 or 2 is answered "Yes," your application cannot be granted until all of the necessary funds are committed or appropriated. In the case of grants from the National Telecommunications and Information Administration, no further action on your part is required. If you rely on funds from a source specified in Question 2, you must advise the F.C.C. when the funds are committed or appropriated. This should be accomplished by letter amendment to your application, in triplicate, signed in the same manner as the original application, and clearly identifying the application to be amended.
/	3. The applicant certifies, except as noted above, that sufficient net liquid assets are on hand or that sufficient funds are available from committed sources to construct and operate the requested facilities for three months without additional funds.
	SECTION IV - PROGRAM SERVICE STATEMENT
	Attach as an Exhibit, a brief description, in narrative form, of the planned programming service relating to the issues of public concern facing the proposed service area.

NOTE: No program service statement need be filed where the proposed station's programming would be wholly "instructional" as that type of programming is defined in the instructions to this Section.

### SECTION VI - EQUAL EMPLOYMENT OPPORTUNITY PROGRAM

1. Does the applicant propose to employ five or more full-time employees?	Yes	No
If Yes, the applicant must include an EEO program called for in the separate Broadcast Equal Employment Opportunity Program Report (FCC 396-A).		

#### SECTION VII - CERTIFICATION

1. Has or will the applicant comply with the public notice requirements of 47 C.F.R. Section 73.3580?

١	/es		No
		∟	1.40

The APPLICANT hereby waives any claim to the use of any particular frequency as against the regulatory power of the United States because of the previous use of the same, whether by license or otherwise, and requests an authorization in accordance with this application. (See Section 304 of the Communications Act of 1934, as amended.)

The APPLICANT acknowledges that all the statements made in this application and attached exhibits are considered material representations, and that all exhibits are a material part hereof and incorporated herein.

The APPLICANT represents that this application is not filed for the purpose of impeding, obstructing, or delaying determination on any other application with which it may be in conflict.

In accordance with 47 C.F.R. Section 1.65, the APPLICANT has a continuing obligation to advise the Commission, through amendments, of any substantial and significant changes in information furnished.

### WILLFUL FALSE STATEMENTS MADE ON THIS FORM ARE PUNISHABLE BY FINE AND IMPRISONMENT. U.S. CODE, TITLE 18, SECTION 1001.

I certify that the statements in this application are true and correct to the best of my knowledge and belief, and are made in good faith.

Name of Applicant	Title
Beacon Broadcating Corproation	President
Signature	Date September 4, 1990

### FCC NOTICE TO INDIVIDUALS REQUIRED BY THE PRIVACY ACT AND THE PAPERWORK REDUCTION ACT

The solicitation of personal information requested in this application is authorized by the Communications Act of 1934, as amended. The principal purpose for which the information will be used is to determine if the benefit requested is consistent with the public interest. The staff, consisting variously of attorneys, analysts, engineers and applications examiners, will use the information to determine whether the application should be granted, denied, dismissed, or designated for hearing. If all the information is not provided, the application may be returned without action having been taken upon it or its processing may be delayed while a request is made to provide the missing information. Accordingly, every effort should be made to provide all necessary information. Your response is required to obtain the requested authority.

Public reporting burden for this collection of information is estimated to vary from 76 to 80 hours with an average of 78 hours 04 minutes per response, including the time for reviewing instructions, searching existing data sources, gathering and maintaining the data needed, and completing and reviewing the collection of information. Comments regarding this burden estimate or any other aspect of this collection of information, including suggestions for reducing the burden, can be sent to the Federal Communications Commission, Office of Managing Director, Washington, D.C. 20554, and to the Office of Management and Budget, Paperwork Reduction Project (3060-0034), Washington, D.C. 20503.

THE FOREGOING NOTICE IS REQUIRED BY THE PRIVACY ACT OF 1974, P.L. 93-579, DECEMBER 31, 1974, 5 U.S.C. 552a(e)(3), AND THE PAPERWORK REDUCTION ACT OF 1980, P.L. 96-511, DECEMBER 11, 1980, 44 U.S.C. 3507.

Exhibit No. 1 Beacon Broadcating Corporation

### STATEMENT OF EDUCATIONAL OBJECTIVE

It shall be the purpose of this organization to have an educational, scientific, cultural, instructional, charitable and spiritual impact on the community. In this regard, the directors of the corporation have perceived several needs in our community:

- 1. An understanding and appreciation of religious literature.
- 2. A religious analysis of the national and local news.
- 3. Regular programming directed to women and addressing the needs of both working and non working women.
- 4. Programming that will educate the community on how to develop strong families.
- 5. Educational programming specifically designed for children.
- 6. An understanding and appreciation for religious oriented music.

The Beacon Broadcasting Corporation intends to meet these needs accordingly:

- 1. Beacon Broadcasting Corporation will air regular, uninterrupted reading of religious and educational books, literature and periodicals.
- 2. Beacon Broadcasting Corporation will broadcast the International Media Service news every hour to provide national, international, and significant religious news, as well as regular reporting on the significant religious events of our own community.
- 3. Beacon Broadcasting Corporation will air programming dedicated to helping women cope with the pressures of today's society. Moody Broadcasting Network's "Woman to Woman", and "Sugar and Spice" will be regular features. Both programs feature household hints, interviews, devotional thoughts and music. Locally produced programming may also be designed by and for women with the same goals.
- 4. Beacon Broadcasting Corporation will transmit programming designed to strengthen the families of Allentown and the surrounding Lehigh Valley. Daily programming like the "Dobson Family Commentary", "Family Forum", "Your Money in Changing Times" and "Insight for Living" will educate our listeners on how to fine tune their families in all areas of health and well being.

	5. Beacon Broadcasting Corporation will air regular programming to teach
<b>t.</b>	
<u> </u>	•

DSCB: 15-7316 (Rev. 11-72)	•	Department of State
Filling Fee: \$75	(Line for numbering) 1573589	Christopher a. Lu
AIN-8 ' Articles of Incorporation— Domestic Honprolit Corporation	COMMONWEALTH OF PENNSYLVANIA DEPARTMENT OF STATE CORPORATION BUREAU	Secretary of the Commonwealth
Commence (Control of the state		(Box for Certification)
	equirements of 15 Pa.C.S. \$7316(relating to artated as a nonprofit corporation, hereby certifies (	
1. The name of the corporation	n is:	
Beacon Broadcastir	ng Corporation	
. The location and post offi wealth is:	ice address of the initial registered office of t	he corporation in this Common-
Suite 205 - 401 No	orth17th Street	
(NUMBER)		(STREET)
Allentown (CITY)	Pennsy	ylvania 18104
pose and purposes: in religious affair all of these things public and private forms of media as sillustration but no vision, electronics	86, as amended, and for the fo to provided instruction, infors, doctrines, creeds and others by any and all lawful means, dissemination and communicationall be deeded appropriate, in the limitation, publications, property, and satellites; and for the all the rights, benefits and property and property.	rmation, and education r matters, and to do manners and methods of on, utilizing various ncluding, by way of rinting, radio, telese purposes to have,
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<b>ХІНЖХИФИЖНОГУФІКК НОГУНОГ</b>	я ХХ <b>СКИ КОНТИТИКИ КОНТИТИТИТИ В КОТИТИТИТИТИТИТИТИТИТИТИТИТИТИТИТИТИТИТИ</b>	фионич

37

9034

Filed this JUN 2 8 1998 of

Commonwealth of Pennsylvania

APPLICANT'S ACC'T NO.

DSCB: 15-7316 (Rev. 11-72)-2

- 5. The corporation is organized upon a nonstock basis.
- 6. (Strike out if inapplicable) The corporation shall have no members. SEE ADDENDUM FOR ARTICLE 6)
- 7. (Strike out if inapplicable) The incorporators constitute a majority of the members of the committee authorized to incorporate (SEE ADDENDIM FOR ARTICLE 7)

  (NAME OF UNINCORPORATED ASSOCIATION)

  by the requisite vote required by the organic law of the association for the amendment of such organic law.
- 8. The name(s) and post office address(es) of each incorporator(s) is (are): (SEE ADDENDUM FOR ARTICLE 8)

John P. Hentosh, M.D., 401 North 17th St., Allentown, PA 18104 Nestor E. Barolin, 460 Longacre Dr., Cherryville, PA 18035 Brooke Hartman, Sr., 1168 Bellair Court, Allentown, PA 18103 George Becker, 2452 South Lumber St., Allentown, PA 18103 John Carpenter, 107 South Walnut St., Macungie, PA 18062 Robert Walker, 6610 Crown Lane, Zionsville, PA 18092

IN TESTIMONY WHEREOF, the incorporator(s) has (have) signed and scaled these Articles of Incor-

# ADDENDUM TO ARTICLES OF INCORPORATION of BEACON BROADCASTING CORPORATION

- 6. The members of the corporation shall be made up of the members of the Board of Directors of the corporation.
- 7. The Board of Directors shall constitute the membership of the corporation and the initial Board of Directors shall be composed of the following individuals who shall hold office until their successors are duly elected and qualified in accordance with the by-laws of the corporation:

John P. Hentosh, M.D.: 401 North 17th Street, Allentown, Pennsylvania 18104

Nestor E. Barolin: 460 Longacre Drive, Cherryville, Pennsylvania 18035

Brooke Hartman, Sr.: 1168 Bellair Court, Allentown, Pennsylvania 18103

George Becker: 2452 South Lumber Street, Allentown, Pennsylvania 18062

John Carpenter: 107 South Walnut Street, Macungie, Pennsylvania 18062

Robert Walker: 6610 Crown Lane, Zionsville, Pennsylvania 18092

8. Upon the voluntary or involuntary dissolution and winding up of the affairs of the corporation, the real and personal property of the corporation and all its other assets shall be distributed to one or more organizations recognized by the Internal Revenue Service as tax exempt under Section 501(c)(3) of the Internal Revenue Code of 1986, as amended, and as being organized exclusively for religious, charitable, or educational purposes, and in no event shall any of the assets of this corporation be distributed so as to inure to the benefit of any member of the corporation or any other individual. The organization or organizations to which such assets are to be distributed shall be determined by a majority of two-thirds (2/3) of the membership eligible to vote at such time.

### APPENDIX B

To be included with FCC Form 301, Application to Construct or Make Changes in an Existing Commercial Broadcast Station.

### CERTIFICATION OF SITE AVAILABILITY

I. The applicant certifies that faith that the site or structure proposed FCC Form 301, as the location of its transto the applicant for applicant's intended process.	mitting antenna, will be available
YES X	۲n
If no, explain fully:	
•	
2. If reasonable assurance is no the proposed site or structure, applicant or reasonable assurance by contacting the owner the site or structure.	
Barry Fisher	( 215 ) 797-4530
Name of Person Contacted	Telephone Number
Person contacted (check one):	
Owner Owner's Agent X	Other (specify)
John Mark	9/4/90
Apartant Brotanatine	
	+ 1

### TABLE OF CONTENTS

# BEACON BROADCASTING CORPORATION APPLICATION FOR A NEW NON COMMERCIAL FM STATION ALLENTOWN, PENNSYLVANIA

Channel 207A

0.15 kW(Max) DA

245 Meters

**Engineering Statement** 

Table I

Table II

Table III

Table IV

Table V

Exhibit VB-1

Exhibit VB-2

Exhibit VB-3

Exhibits VB-4A & 4B

Exhibits VB-5A & 5B

Exhibit VB-6

Exhibit VB-7A

Exhibit VB-7B

Exhibit VB-7C

Exhibits VB-7D thru VB-7H

Exhibit VB-8

FCC Form 340, Section V-B

FM Separation Study

Channel 6 TV Separation Study

Distance to Proposed Coverage Contours

FM Allocation Study

Channel 6 TV Interference Study

Sketch of Antenna

Directional Antenna Information

Interference Statement

Maps of Site

Predicted Coverage Contours

Map Showing FM Allocation Study

TV Channel 6 Interference Study

Map Showing TV Channel 6 Interference

Contour and Shadow Area

Map Showing TV Channel 6 Interference

Area

Terrain profile graphs

Table showing computation on

Radiation Level

### ENGINEERING STATEMENT

### BEACON BROADCASTING CORPORATION APPLICATION FOR A NEW NON COMMERCIAL FM STATION ALLENTOWN, PENNSYLVANIA

Channel 207A

0.15 kW(Max) DA

245 Meters

May 30, 1990

### **ENGINEERING STATEMENT**

# BEACON BROADCASTING CORPORATION APPLICATION FOR A NEW NON COMMERCIAL FM STATION ALLENTOWN, PENNSYLVANIA

Channel 207A

0.15 kW(Max) DA

245 Meters

This Engineering Statement is submitted in support of an application by Beacon Broadcasting Corporation seeking authorization to construct a new non commercial FM Broadcast Station to serve Allentown, Pennsylvania. The proposal for this facility requests operation on Channel 207A (89.3 MHz), with a maximum effective radiated power (ERP) of 150 watts in the horizontal and vertical planes utilizing a directional antenna system. The effective antenna height above average terrain (HAAT) is 245 meters.

The applicant proposes to sidemount an FM antenna on WFMZ(TV) tower. The geographic coordinates of WFMZ(TV)'s tower site are:

North Latitude: 40° 33' 54" West Longitude: 75° 26' 26"

These coordinates were taken from WFMZ (TV) records on file with the Commission and verified by using a 7.5 minute series topographic quadrangle map published by the U.S. Geological Survey. The ground elevation at the proposed site is 930 feet (283.4 m) above mean sea level.

It is proposed to install an FM transmitter with the transmitter power output adjusted to 0.085 kW. The transmitter power output will then be fed through 116 meters of Andrew, Type HJ5-50, 7/8 inch air dielectric heliax transmission line. Attenuation for this type of line operating on 89.3 MHz is approximately 1.15 dB/100 meters. The rated efficiency for this length of line is calculated to be 73.6%.

A Harris, Type FMD-3A, 3 bay low power directional dual polarized FM antenna will be used for the proposed operation. The manufacturer's rated power gain for the proposed antenna is 2.39 in horizontal plane and 2.29 in vertical plane.

Based upon the above noted transmitter power output, transmission line efficiency and antenna power gain, the proposed maximum ERP is calculated to be  $0.150~\rm kW$  in horizontal plane and  $0.143~\rm kW$  in vertical plane.

Engineering Statement Beacon Broadcasting Corporation Allentown, Pennsylvania Page Two

Table I is a study of all co-channel and adjacent channel allocations, applications and licensed FM stations pertinent to operating on Channel 207 at the proposed site.

Table II lists all Channel 6 television stations pertinent to the proposed FM operation on Channel 207.

Table III includes the pertinent data used to predict the distances to the 70 dBu and 60 dBu coverage contours of the proposed operation. These distances were determined by using Figure 1, F(50,50) FM propagation curves of Section 73.333 of the Commission's Rules, at an effective radiated power as defined on the directional antenna pattern, and the antenna elevation data shown in Table III. The average elevation between each 2-10 mile sector (taken from WFMZ(TV) records) was used in determining the effective antenna height. All contour predictions were done in accordance with the provisions of Section 73.313 of the FCC's Rules and Regulations.

Table IV is a tabulation of all FM stations pertinent to an allocation study for Channel 207 located at the proposed site. The data and computations listed in this Table show that the proposed Channel 207 complies with Section 73.509 of the FCC Rules and Regulations, with the exception of new application 891019MF Allentown, Pennsylvania and new application 900202MC Bethlehem, Pennsylvania. Those applications are mutually exclusive with this instant application for a new non commercial FM station.

Table V is a tabulation of all affected Channel 6 television stations pertinent to an allocation study for Channel 207 located at the proposed site.

Exhibit VB-1 is a sketch of the proposed antenna and supporting structure. All pertinent heights and elevation data are included.

Exhibit VB-2 contains all the information relating to the proposed directional antenna.

Exhibit VB-3 is a statement which addresses the potential of intermodulation interference generated to radio and TV stations in the vicinity of the proposed site and the applicant's acceptance of the responsibility in this regard.

Exhibits VB-4A & VB-4B are maps showing the proposed site and surrounding area. Exhibit VB-4A is a full scale section of a 7.5 minute topographic quadrangle map (Allentown, PA) showing the proposed transmitter site and a coordinate grid system. Exhibit VB-4B is a reduced version of the same 7.5 minute topographic quadrangle map that shows the proposed transmitter site and all official markings to verify the coordinate grid system of Exhibit VB-4A.

Engineering Statement Beacon Broadcasting Corporation Allentown, Pennsylvania Page Three

Exhibits VB-5A & VB-5B are maps showing the proposed coverage contour. Exhibit VB-5A is a section of a 1/250,000 scale topographic map (Newark, N.J.; PA., N.Y) showing the proposed transmitter site and the 1.0~mV/m (60 dBu) coverage contour. Exhibit VB-5B is a reduced version of the full 1/250,000 scale map showing the above noted information and containing all official markings and identifications to verify Exhibit VB-5A.

Exhibit VB-6 is a map showing an allocation study using the data listed in Tables I, III & IV of this report. As shown, Channel 207 complies with Section 73.509 of the Rules and Regulations.

Exhibit VB-7A is a statement addressing the procedures used to compute the interference area and showing compliance with Section 73.525 of the FCC Rules.

Exhibit VB-7B is a map showing the affected Channel 6 TV interference area using the data from Tables II, III & V of this report and shadow area.

Exhibit VB-7C is a map showing the effected Channel 6 TV interference area.

Exhibits VB-7D thru VB-7H are terrain profile graphs showing terrain elevations versus distance.

Exhibit VB-8 is a Table showing computation in compliance with the formulas



TABLE I

### FM SEPARATION STUDY

### BEACON BROADCASTING CORPORATION APPLICATION FOR A NEW NON COMMERCIAL FM STATION ALLENTOWN, PENNSYLVANIA

	Channel 207A	0.15 kW(Max) DA	245 Meters	
<u>Designation</u>	<u>Channel</u>	Nearest Allocation or Authorized Station	Separation (km) <u>Actual Required</u>	<u>1</u>
Co-channel	207A	New Allentown, PA Apc., 891019MF	0.00 74 <u>3</u>	J
	207A	WRDV, Warminister, PA Apc., BPED-88042MA	48.94 63 <u>4</u>	_/
	207A	WRDV, Warminister, PA Apc., BLED-801215AB	48.94 64 4	J
	207A	WHHS, Havertown, PA	65.63 60 2	J
1st Adjacent	206A	WXVU, Villanova, PA	56.78 41 2	_/
	206A	WYBF, Radnor Towns, PA	56.78 41 _2	_/
	208A	New Bethlehem Town, PA Apc., 900202MC	15.48 29 <u>3</u>	_/
2nd Adjacent	205A	New, Sellersville, PA	21.51 22 4	J
	209A	WDVR, Delaware Town, NJ	41.33 20 _2	_/
3rd Adjacent	210	1/		
■ E Benta	ባተወካ	HIVT Freeze DA.	04.74 15 0	,

### TABLE II

### TV SEPARATION STUDY

### BEACON BROADCASTING CORPORATION APPLICATION FOR A NEW NON COMMERCIAL FM STATION ALLENTOWN, PENNSYLVANIA

Channel 207A

0.15 kW(Max) DA

245 Meters

Affected Channel 6	Separation (km)		
<u>Television Station</u>	<u>Actual</u>	Required	
WPVI, Philadelphia, PA	60.28	196 / <u>1</u>	

<sup>/1</sup> Stations to be considered in accordance with Section 73.525(a)(1) of the Rules and Regulations.

### TABLE III

### DISTANCE TO PROPOSED COVERAGE CONTOURS

### **BEACON BROADCASTING CORPORATION** APPLICATION FOR A NEW NON COMMERCIAL FM STATION ALLENTOWN, PENNSYLVANIA

Channel 207A

0.15 kW(Max) DA 245 Meters

Azimuth <u>°True</u>	Average Elevation 2-10 miles (meters A.M.S.L.)/1	Effective Antenna Height Above Average Terrain (Meters)	Effective Radiated Power (kW)	Distan Propo Contour <u>70 dBu</u>	sed
0	127.1	269.3	0.124	10.1	18.0
45	122.5	273.9	0.144	10.6	18.9
90	143.2	253.2	0.11	9.6	16.9
135	166.1	230.3	0.032	6.5	11.9
180	199.3	197.1	0.061	7.1	12.8
225	219.1	177.3	0.148	8.6	15.2
270	123.4	273.0	0.124	10.2	18.1
315	111.8	284.6	0.147	10.9	19.3

283.4 meters
151.6 meters
244.8 meters / 2
113.0 meters
396.4 meters
203.6 meters
487.0 meters

### Coordinates

North Latitude: 40° 33' 54" West Longitude: 75° 26' 26"

- /1 Data taken from Television Station WFMZ-TV records on file with the FCC. Data converted to meter from feet.
- / 2 Rounded to 245 meters.

## TABLE IV FM ALLOCATION STUDY

# Lechman & Johnson Lanham, Maryland

Page 1 May 11, 1990

Service contours based on FCC F(50,50) curves

Title: ALLENTOWN, PA Latitude: 40-33-54 Channel: 207 C/R 396.4 meters (1300.5 feet) A.M.S.L. Longitude: 75-26-26

	CITO	iiiiei. 201	0/16 000.4	meters ( 1500.	J 1660) H.II.
		Bearing degrees)	HAAT (meters) (feet)	ERP (kiloWatts) (dBk)	60 dBu ( 1 mV/m) contour
		.0	276.3 906.5	.124 -9.06	18.2 km 11.3 mi
`	٠ ا	10.0	274.6 900.9	.121 -9.16	18.1 km 11.2 mi
	*	20.0	282.5 926.8	.124 -9.08	18.4 km 11.5 mi
	*	30.0	278.4 913.4	.130 -8.85	18.5 km 11.5 mi
	*	40.0	275.5 903.9	.140 -8.53	18.8 km 11.7 mi
	•	45.0	274.9 901.9	.144 -8.41	18.9 km 11.7 mi
	*	50.0	269.3 883.5	.147 -8.32	18.8 km 11.7 mi
	*	60.0	247.1 810.7	.150 -8.24	18.1 km 11.2 mi
	*	70.0	260.8 855.6	.145 -8.40	18.4 km 11.4 mi
	*	80.0	242.5 795.6	.128 -8.93	17.2 km 10.7 mi
		90.0	252.9 829.7	.111 -9.56	16.9 km 10.5 mi
	*	100.0	263.0 862.9	.085 -10.7	16.1 km 10.0 mi
•	*	110.0	223.8 734.3	.061 -12.2	13.6 km 8.5 mi
	*	120.0	220.9 724.7	.045 -13.5	12.6 km 7.8 mi
	*	130.0	228.3 749.0	.035 -14.5	12.1 km 7.5 mi
		135.0	234.6 769.7	.032 -14.9	12.0 km 7.4 mi

# Lechman & Johnson Lanham, Maryland

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### Service contours based on FCC F(50,50) curves

Title: ALLENTOWN, PA Latitude: 40-33-54 Channel: 207, C/R 396.4 meters (1300.5 feet) A.M.S.L. Longitude: 75-26-26

	Bearing (degrees)	HAAT (meters) (feet)	ERP (kiloWatts) (dBk)	60 dBu ( 1 mV/m) contour
k	<b>14</b> 0.0	235.9 774.0	.031 -15.1	11.9 km 7.4 mi
_	150.0	227.3 745.7	.031 -15.1	11.6 km 7.2 mi
×	<b>×</b> 160.0	216.5 710.3	.035 -14.5	11.8 km 7.3 mi
,	<b>*</b> 170.0	202.7 665.0	.045 -13.5	12.1 km 7.5 mi
	180.0	204.4 670.6	.061 -12.2	13.0 km 8.1 mi
>	<b>*</b> 190.0	212.3 696.5	.085 -10.7	14.4 km 8.9 mi
>	* 200. <b>0</b>	210.6 690.9	.111 -9.56	15.3 km 9.5 mi
,	* 210.0	207.6 681.1	.131 -8.83	15.9 km 9.9 mi
3	* 220.0	183.5 602.0	.145 -8.40	15.4 km 9.6 mi
	225.0	182.1 597.4	.148 -8.29	15.4 km 9.6 mi
3	* 230.0	192.6 631.9	.150 -8.24	15.9 km 9.9 mi
2	* 240.0	256.0 839.9	.147 -8.32	18.3 km 11.4 mi
;	* 250.0	273.8 898.3	.140 -8.53	18.7 km 11.6 mi
;	* 260.0	275.0 902.2	.130 -8.85	18.4 km 11.5 mi
•	270.0	273.9 898.6	.124 -9.08	18.1 km 11.3 mi
:	* 280.0	270.9 888.8	.121 -9.16	17.9 km 11.2 mi

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### Service contours based on FCC F(50,50) curves

Latitude: 40-33-54 Title: ALLENTOWN, PA Channel: 207 C/R 396.4 meters (1300.5 feet) A.M.S.L. Longitude: 75-26-26

		HAAT (meters) (feet)	ERP (kiloWatts) (dBk)	(	60 dE 1 m conto	(m/V)
* 2	90.0	270.5 887.5	.124 -9.06		18.0 11.2	
3	00.0	280.3 919.6	.132 -8.79		18.7 11.6	
* 3	10.0	274.3 899.9	.143 -8.45		18.8 11.7	
3	15.0	280.3 919.6	.147 -8.34		19.2 11.9	
* 3	20.0	287.5 943.2	.149 -8.27		19.5 12.1	
* 3	30.0	288.4 946.2	.149 -8.27		19.5 12.1	
* 3	40.0	298.9 980.6	.143 -8.45		19.7 12.2	
* 3	50.0	289.5 949.8	.132 -8.79		19.0 11.8	
	HAAT:	247.4 811.8				

Note: Radial(s) denoted by "\*" not included in HAAT calculation.